An unknown scops owl, *Otus* sp., from Sumba, Indonesia

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On 4 September 1987, while searching in central Sumba for the Sumba Boobook *Ninox rudolfi*, we heard an unfamiliar owl song from three individuals. Although no scops owl is known from Sumba (White & Bruce, 1986), when we tape-recorded the call and eventually got good views of one of the owls at *c*. 20m distance, we realized the calling bird was a scops owl, *Otus* sp., rather than a boobook, *Ninox* sp. B.F.K. returned to the site on 7 September 1987 and watched one of the scops owls for *c*. 30 min, using a 6-cell flashlight and 10x binoculars at a distance of *c*. 5 m, and occasionally down to 3 m. At this close range, the bird was seen to be undoubtedly a scops owl, at the smaller end of *Otus* size range. The plumage was mainly rufous, with distinctive fine wavy barring or vermiculations on the underparts, on which neither spots nor streaks were visible. Ear tufts were not noted. On that night four scops owls were heard.

At that time, neither of us had ever seen *Ninox rudolfi* and its call was undescribed. However, in 1992 Gerry Richards gave B.F.K. a tape recording of this species and, on 26 August 1993, playback of that tape at the scops owl site brought a Sumba Boobook in close and enabled B.F.K. to see it well and make an improved tape recording. It was similar in size to *Ninox novaeseelandiae* and much larger than the scops owl mentioned above. Its entire underparts were white with narrow dark barring, the barring broader than on the scops owl and lacking any wavy effect.

Subsequently, B.F.K. has taken several tour groups to the site where all have seen the scops owl and most have seen the boobook. The dates of the *Otus* sightings, with the number seen or heard, are: 25 August 1989 (4 birds), 15 August 1991 (4), 26 August 1993 (6), 29 August 1995 (2), 20 August 1997 (7). At another site a few kilometers to the south, two were heard on 22 August 1997.

Further *Ninox rudolfi* observations at the site by B.F.K. and his tour groups were: 29 August 1995 (2), and 20 August 1997 (5). At the second site where the scops owl was seen a pair of Sumba Boobooks was seen by flashlight copulating on 22 August 1997, *c.* 1 h after sunset.

The scops owl is readily distinguished from *Ninox rudolfi* by its song, its much smaller size, and the very fine wavy barring on its underparts (rather than broader regular barring). The barring of the scops owl is visible only at very close range, while that of *Ninox rudolfi* can be seen at much greater distances.

The song of the *Otus* (fig. 1) is a single, low, whistled *who, hop* or *hoop* repeated at intervals of 3-4 s. The pitch of the song of one sex is apparently somewhat lower than the other (fig. 1). What seem to be pairs regularly call antiphonally. This species often calls spontaneously at night, just after dusk, in August and September and is normally responsive to tape playback. It is fairly common and is found inside trees

and bushes, usually at lower heights than *Ninox rudolfi*. The habitat at the site is broad-leaved evergreen forest, with some old large trees and second growth in places where trees have been removed. The scops owl cannot usually be observed from the forest edge.

The song of *Ninox rudolfi* (fig. 1) is a low, sharp and hard but musical *took* or *chuck*, repeated 3 times per second, often for long periods. Spontaneous calling in this species in August and September is rare and tape playback is normally required to locate them. Usually, *N. rudolfi* perches higher in the trees than the scops owl and more often in exposed places, and can normally be seen from the forest edge. The species is fairly common and is found in the same areas as the scops owl.

The discovery and subsequent observations were made at 600m elevation in the forest south of Km 49 (from Waingapu) on the Lewa road west of Waingapu on the island of Sumba in Indonesia, at 9°44'S, 119°56'E. The bulk of Sumba is open grassland, the forest patches rather like oases. The large patch of forest at the discovery site is rather isolated. The largest areas of forest on Sumba are on the south side of the island and sightings by other observers of both owls have been made there.

Because the song of the Sumba *Otus* is unlike that of any other known species in Indonesia, either it is an undescribed species, or it is *Otus alfredi*, currently known only from the mountains of nearby Flores (Widodo *et al.* 1999). We are inclined to favour the idea that it is *Otus alfredi*, which is a rufous species, lacking dark spots or streaks on the underparts and with fine wavy barring on the breast and belly (although the barring seems somewhat less uniform than on the birds seen by B.F.K. on Sumba). The song of *Otus alfredi* remains unknown and the species is known from only four specimens, one netted bird, and one sighting. At the type locality of *Otus alfredi*, Gunong Repok, in September 1987, B.F.K. spent most of a night listening at various elevations up to the summit and heard only *Otus silvicola* (at 1,100 m). Furthermore, repeated playback of the Sumba *Otus* call in the mountains around Ruteng, where

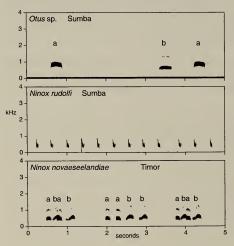


Figure 1: Sonagram of the songs of *Otus* sp. and *Ninox rudolfi* from Sumba, Indonesia, and *N. novaeseelandiae* from Timor. The *Otus* sp. recording is of 2 birds, presumably a pair, the first and third (a) songs being from one bird (at which the microphone was directed) and the middle song (b—this bird was off to the side) was of the other bird (probably of the opposite sex). The *Ninox rudolfi* cut is of a single bird while that of *N. novaeseelandiae* cut is of two birds, presumably a pair; these recordings were in response to playback.

Otus alfredi was recently rediscovered, failed to elicit a response. This does not however preclude the possibility that the Sumba bird is O. alfredi.

Otus alfredi was initially collected at c. 1,050 m and the mist-netted bird was at 1,400m, while the Sumba Otus was found at 600 m. This disparity in elevation might lead one to conclude that the Sumba Otus could not be O. alfredi. However, it should be noted that the Russet-backed Jungle Flycatcher Rhinomyias oscillans has a similar altitudinal range, i.e. 600 m on Sumba, but 1,200-1,800 m (B.F.K. pers. obs.) on Flores.

Flores is somewhat larger than and 45 km due north of Sumba. The actual sites of the Sumba *Otus* and *Otus alfredi* are 130-135 km apart. The highest elevation on Sumba is *c*. 1,200 m while that of Flores is *c*. 2,330 m. Flores originally had a higher percentage of its area as forest (broad-leaved evergreen).

Others have seen and heard the Sumba *Otus* at the site of our discovery and elsewhere in Sumba. Coates & Bishop (1997) listed an *Otus* sp. for Sumba, while erroneously noting that it was first discovered in 1991. Linsley *et al.* (1999) report an unidentified owl on Sumba and mention 8 observers who have reported it, some of whom called it an *Otus*, while others called it *Ninox rudolfi*.

While noting that *Ninox rudolfi* has been considered conspecific with *Ninox novaeseelandiae*, White & Bruce (1986) retained it as a full species. Its song bolsters that position, as it is quite different from that of *N. novaeseelandiae* from Timor (fig. 1). The song of *N. novaeseelandiae* on Timor can be described as a loud, hollow, mellow *too too*. Furthermore, the various forms of *N. novaeseelandiae* have the breast and belly broadly streaked as opposed to the barring of *N. rudolfi*.

We publish this note because of the confusion as to the scops owl's identity, and to alert the ornithological community so that eventually a specimen might be obtained in order that the taxon can be described.

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